Jan. 14, 1930. M. SAMSON 1,743,980

RECEPTACLE

Filed June 12, 1926

Fig. 1.

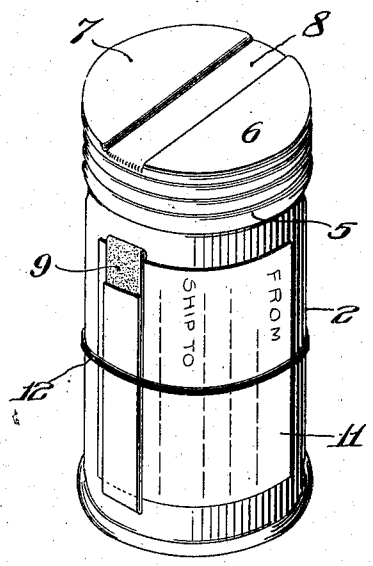


Fig. 2.

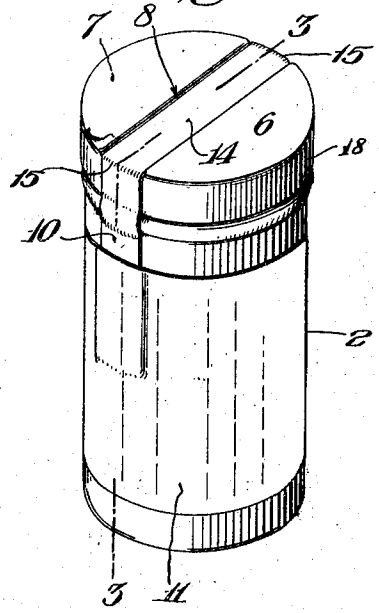


Fig. 3.

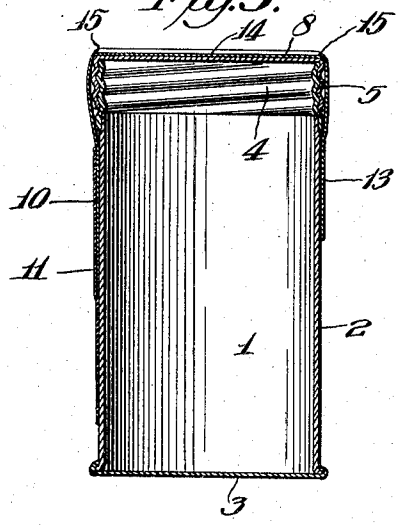
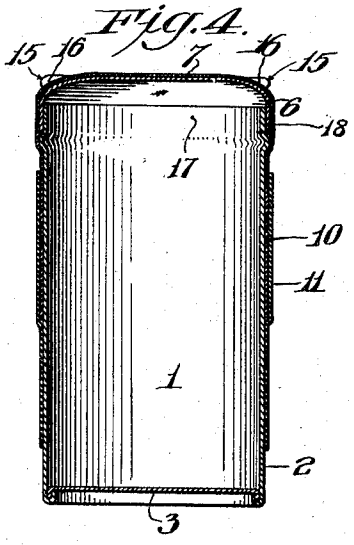


Fig. 4.



Inventor
Meyer Samson,
By Leonard L. Kalish
Attorney.

Patented Jan. 14, 1930 1,743,980

UNITED STATES PATENT OFFICE

MEYER SAMSON, OF PHILADELPHIA, PENNSYLVANIA

RECEPTACLE

Application filed June 12, 1926. Serial No. 115,647.

My invention relates to a new and useful receptacle, adapted to be used for handling or shipping medical specimens or the like, and it relates more particularly to a novel method of sealing such container or receptacle, for the purpose of insuring against any tampering with the contents thereof, and to insure against the absolute purity of the product contained in the receptacle, and insure that the content is genuine.

My invention relates more particularly to a shipping container adapted specially for use by physicians and patients in shipping or transmitting medical specimens to the medical laboratory for examination or analysis.

It has been the practice in packaging commodities of all sorts, for handling or shipping purposes, or for general merchandizing purposes, to seal such container or receptacle, in such a manner that the seal may be easily broken, when it is desired to open the container or receptacle. For this purpose it has been customary to secure, to one side of the container or receptacle, one end of an adhesive paper sealing strip, then to place the sealing strip across the closure, or lid, of the container or receptacle, and then adhesively to secure the free end of the adhesive paper sealing strip, to the opposed side of the container in a taut condition, so as thereby to seal the closure or lid of the container.

This practice has been carried out primarily by the original manufacturer or maker of the product so packed, and he merely placed separate sealing strips over the closure of the shipping container as the last step in the packaging of the product.

I have found that when physicians and patients are supplied with specimen containers and separate sealing strips, the specimen-filled containers are returned in great many cases, without the sealing strips having been applied, because the sealing strips were either misplaced or lost or forgotten by the physician or patient at the time the specimen was packed for transmittal to the laboratory.

Then too, in the use of the paper sealing strips of this sort, considerable difficulty has been experienced on account of the liability of such sealing strip to breakage during transportation or handling, particularly at the corners of the lid. Thus any slight impact or abrasion, during handling, shipping, or the like, readily breaks the paper sealing strip at the corners and thereby enables the contents thereof to be exchanged, altered or adulterated, without any detection by the consignee.

To remedy the foregoing conditions, I have devised a shipping container specially adapted for medical specimens, which is provided with a detachable closure and a sealing strip having one end thereof initially secured to one side of the container and extending in the direction of the closure, and having the loose, free or unattached portion thereof, snugly secured to the body of the container in a temporary manner, so that the container may thus be distributed or shipped to the ultimate user with the sealing strip safely attached to the container and always ready for use by the physician or patient so that its use may be insured to the maximum extent.

By my novel invention I also provide a receptacle, having a lid or closure of any suitable type, either the frictionally engaging or the screw threaded type, said closure or lid of my novel construction being provided with corner depressions or a transverse recess or channel of suitable depth, extending across the top thereof, adapted to receive the transverse portion of the adhesive paper sealing strip.

Thus, according to my invention, I provide the container with an adhesive paper sealing strip having one end thereof initially adhesively secured to the wall of the container, and having the remaining portion thereof extending in the direction of the closure and being folded back upon itself snugly against the side of the container and temporarily secured thereto by a readily detachable fastener (such as a rubber band) encircling the container and embracing the folded-back sealing strip, and adapted to be released by the ultimate user and to be extended across the top of the closure, to be seated in the transverse recess or channel of such closure, and then to be finally adhesively secured to the

opposed side of the container, thereby to seal said closure or lid onto the container. With the seal strip thus provided and arranged, it will always be ready and in good condition for its final use and will not be lost, mislaid, forgotten or overlooked by the ultimate user (physician or patient), and with the sealing strip thus seated in the transverse recess or channel of the closure or lid, it is protected against abrasion or impact, by said closure or lid itself, said strip being below the effective surface of the lid or closure.

For the purpose of illustrating my invention, I have shown in the accompanying drawings, forms thereof which are at present preferred by me, since they will give in practice satisfactory and reliable results, although it is to be understood that the various instrumentalities of which my invention consists can be variously arranged and organized and that my invention is not limited to the precise arrangement and organization of these instrumentalities as herein shown and described.

Referring to the drawings:

Figure 1 represents a perspective view of a container of the screw cap type, shown in the unused condition, embodying my invention.

Figure 2 represents a similar perspective view, of a friction cap type of container, also embodying my invention and shown in the sealed condition.

Figure 3 represents a vertical section on line 3—3 of Figure 1, illustrating, however, the container of my novel construction and in the sealed condition.

Figure 4 represents a vertical section of a modified form of a lid construction also embodying my invention, applied to a friction cap type of container, and illustrating the same in the sealed condition.

Referring to the drawings, in which like reference characters indicate like parts, 1 designates a container of any desired construction, such as screw cap type illustrated in Figures 1 and 3, or the friction cap type illustrated in Figures 2 and 4, of the drawings, adapted to receive, and to be threadedly engaged by the lower pendant and correspondingly threaded flange 5 of the lid or cap 6, or having a straight frictional annular terminal portion 17, as shown in Figures 2 and 4, adapted to receive and to be frictionally, or otherwise, engaged by the snugly fitting lower pendant flange 18 of the cap 6.

The threaded flange 5 is adapted to seat snugly onto the upper threaded terminal portion of the container, so as to retain the lid or cap 6 upon the container without necessarily threading the cap onto the container, to the limit, that is, without tightening up the same.

The cap or lid 6 is provided with a flat upper portion 7, having a transversely and diametrically extending flat recess or channel 8 therein, of suitable depth. An adhesive paper sealing strip 9, is secured at one end to the side of the container, as at 10. Any suitable label 11, or the like, may be superimposed upon the end 10 of the sealing strip 9, in a manner shown either in Figures 1 and 3 or in Figures 2 and 4. The unused containers are in the condition shown in Figure 1. Thus, the sealing strip 9, having the end 10 thereof permanently secured to the container, is folded back upon itself a suitable number of times, parallel to the wall of the container, and retained in such position temporarily by a rubber band 12 or the like, snugly against the side of the container, so that it will remain intact during shipment and handling while container is empty, and be ready for use at the time the container is filled.

In use, the object to be packaged such as a specimen or specimen bottle, is placed in the receptacle and the cap 6 is then applied thereto, either in the manner shown in Figures 1 and 3, or in the manner shown in Figures 2 and 4. Whether a screw cap, (Figures 1 and 3), a friction cap, (Figures 2 and 4), or any other type of cap is employed, the cap 6 is turned to a point at which the transverse recess 8 will register with the sealing strip 9. In this position of the recess 8, the adhesive strip 9 is released from the temporary retaining band or means 12, and is placed across the lid or cap 6 so as to seat snugly in said transverse recess 8, and the free end 13 thereof is then finally adhesively secured to the opposed side of the wall of the container, by wetting, and in such a manner as to retain the sealing strip 9 taut around the cap or lid 6, when thus seated in the recess 8.

The transverse portion 14 of the sealing strip 9, is thus protected against any impact or abrasion, particularly at the corners 15 thereof and thus any accidental breakage of the same during transit is practically eliminated.

In Figure 4 I have shown a modified form or construction, wherein the transverse recess is not extended entirely across the lid or cap 6, but merely provided at the corners 15 thereof as at 16, whereby the points of greatest exposure and most subject to impacts and abrasion, that is, the corner points along the sealing strip 9, are amply protected.

It will now be apparent that I have devised a novel and useful construction in receptacle, which embodies the features of advantage enumerated as desirable in the statement of the invention and the above description, and while I have, in the present instance, shown and described preferred embodiments thereof which will give in practice satisfactory and reliable results, it is to be understood that such embodiments are susceptible of modification in various particulars without departing from the spirit or scope of the invention or sacrificing any of its advantages.

Having thus described my invention, what I claim as new and desire to secure by Letters Patent is:—

1. A shipping container including a body and a closure therefor, an adhesive sealing strip having one end thereof initially secured to the wall of said container and having the remaining portion thereof extending in the direction of said closure and being secured snugly against the wall of the container by temporary retaining means, and being adapted to be released from said temporary retainer and to be extended across said closure and to have its free end finally secured to the wall of the container.

2. A shipping container including a body and a closure therefor, having a seal receiving recess, an adhesive sealing strip having one end thereof initially secured to the wall of said container and having the remaining portion thereof extending in the direction of said closure and being secured snugly against the wall of the container by temporary retaining means, and being adapted to be released from said temporary retainer and to be extended across said closure and seated in said recess thereof, and to have its free end finally secured to the wall of the container.

3. A shipping container including a body and a closure therefor, a sealing strip having one end thereof initially secured to the wall of said container and having the remaining portion thereof extending in the direction of said closure and being secured snugly against the wall of the container by temporary retaining means, and being adapted to be released from said temporary retainer and to be extended across said closure and to have its free end finally secured to the wall of the container.

4. A shipping container including a body and a closure therefor, having a seal receiving recess, a sealing strip having one end thereof initially secured to the wall of said container and having the remaining portion thereof extending in the direction of said closure and being secured snugly against the wall of the container by temporary retaining means, and being adapted to be released from said temporary retainer and to be extended across said closure and seated in said recess thereof, and to have its free end finally secured to the wall of the container.

MEYER SAMSON.